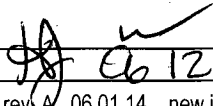
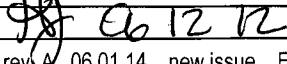


Date: Tuesday, 12/12/2006 10:31:52 AM  
 User: Kim Johnston

## Process Sheet

Customer : CU-DAR001 Dart Helicopters Services  
 Job Number : 29903  
 Estimate Number : 11875  
 P.O. Number : N/A  
 This Issue : 12/12/2006 S.O. No. : N/A  
 Prsht Rev. : NC  
 First Issue : N/A Type : MACHINED PARTS  
 Previous Run : 27657  
 Drawing Name : RIGHT ARM WELDMENT  
 Part Number : D33545  
 Drawing Number : D3354 REV.A  
 Project Number : N/A  
 Drawing Revision : A  
 Material : N/A  
 Due Date : 1/10/2007 Qty: 10 Um: Each  
 Written By :   
 Checked & Approved By :   
 Comment : est rev A 06.01.14 new issue EC

## Additional Product

Job Number:



Seq. #: Machine Or Operation: Description :

1.0 M1010B0750X0200 1010-1025 BAR



Comment: Qty.: 0.4148 f(s)/Unit Total: 4.1475 f(s)

1010-1025 BAR

AISI 1010-1025 Steel bar 2.00" x 0.750"

Batch: M15925

2.0 BAND SAW BAND SAW



Comment: BAND SAW

Cut blanks 4.625" long

J.L. 06/12/19 (10)

3.0 HAAS1 HAAS CNC VERTICAL MACHINING #1



Comment: HAAS CNC VERTICAL MACHINING #1

1-Machine as per Folio FA612 and Dwg D3353

2- Debur

J.L. 06/12/20

4.0 QC2 INSPECT PARTS AS THEY COME OFF MACHINE



Comment: INSPECT PARTS AS THEY COME OFF MACHINE

J.L. 06/12/20 (18)

5.0 QC8 SECOND CHECK



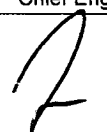
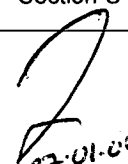

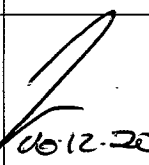
Comment: SECOND CHECK

J.L. 06/12/20 (10)

# Dart Aerospace Ltd

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: D3354-5 PAR #: N/A Fault Category: CNC NCR: Yes No DQA: HA Date: 07.01.05  
 QA: N/C Closed: HA Date: 07.01.05

NCR: 29903		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			
06/12/20	3	- 3 parts scraped - 1 part is short of .060 - 1 part $\phi 1.250^{+0.05}_{-0.01}$ is .002 over - 1 part holes are .005 too small, can not re-bore	 Q21042	- scrap + replace.	S.L. 06/12/20	 07.01.04	 Q21042	 06.12.20

NOTE: Date & initial all entries



Date: Tuesday, 12/12/2006 10:31:52 AM  
User: Kim Johnston

## Process Sheet

Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: RIGHT ARM WELDMENT

Job Number: 29903

Part Number: D33545

Job Number:



Seq. #:

Machine Or Operation:

Description :

6.0

PACKAGING 1

PACKAGING RESOURCE #1



*Cpl 07-01-03*



*(10)*

Comment: PACKAGING RESOURCE #1

7.0

QC21

FINAL INSPECTION/W/O RELEASE



*(10)*

Comment: FINAL INSPECTION/W/O RELEASE

*07/01/03*

Job Completion



*Cpl 07/01/03*

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

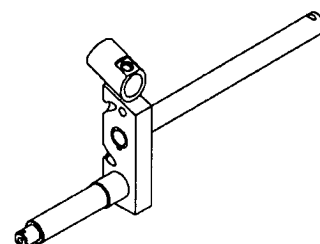
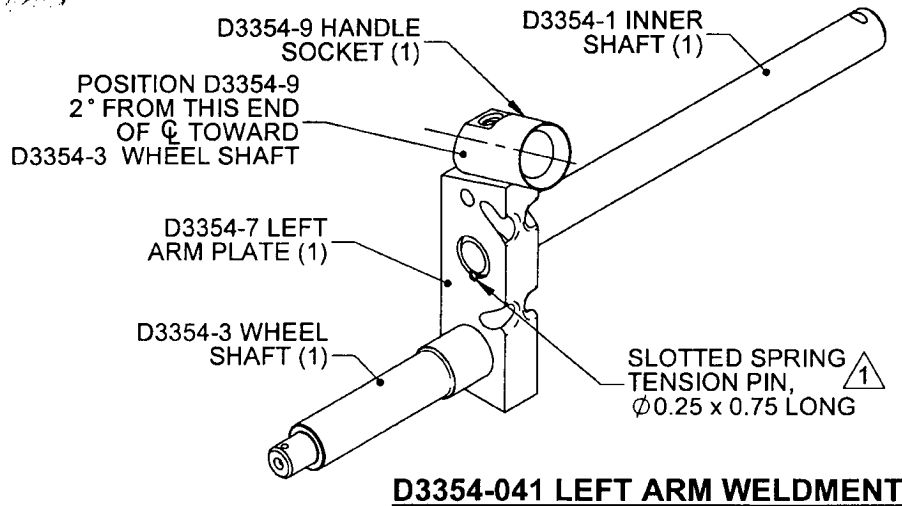
**NOTE:** Date & initial all entries



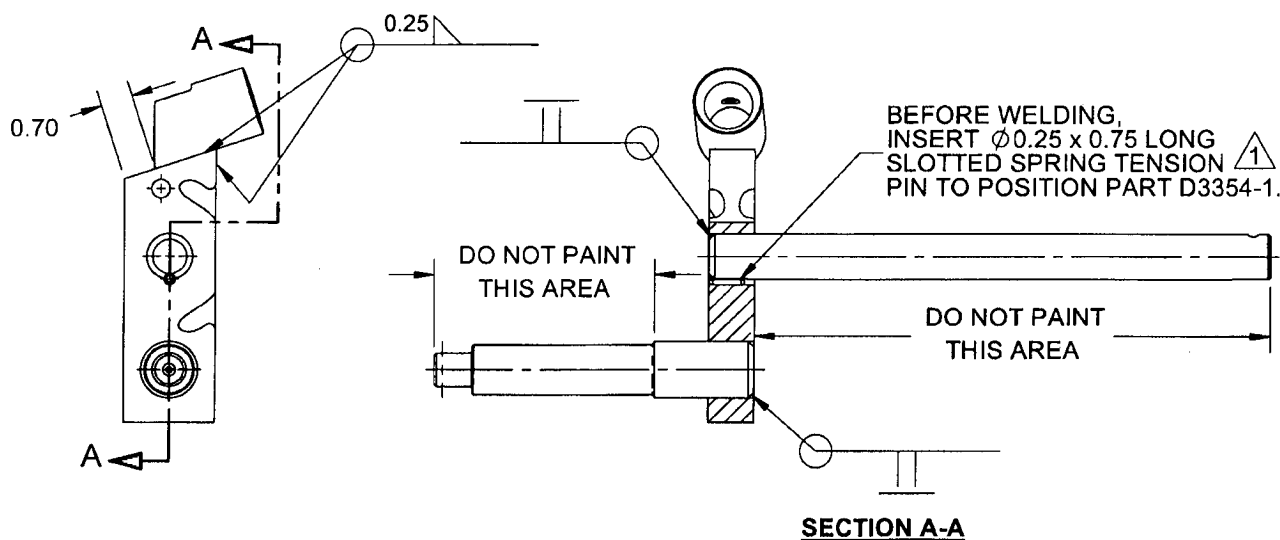


DESIGN RF	DRAWN BY RF	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
CHECKED <i>[Signature]</i>	APPROVED <i>[Signature]</i>	DRAWING NO. D3354	REV. A SHEET 1 OF 7
DATE 04.12.13	TITLE LEFT ARM WELDMENT		SCALE 1:4
A	04.12.13	NEW ISSUE	

RELEASED  
86/02/02



**D3354-042 MIRROR  
ARM WELDMENT**



**NOTES:**

- 1) POSSIBLE SUPPLIER: SPAENAU, P/N TP-134
- 2) WELD PER DART QSI 004
- 3) FINISH: POWDER COAT PAINT FIRE RED (4.3.5.10) PER DART QSI 005.4.3
- 4) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 5) ALL DIMENSIONS ARE IN INCHES
- 6) BREAK ALL SHARP EDGES 0.010 TO 0.020

SHOP COPY  
RETURN TO  
ENGINEERING  
UNCONTROLLED COPY  
SUBJECT TO AMENDMENT  
WITHOUT NOTICE  
WORK ORDER  
NO. 29903

**COPYRIGHT © 2004 BY DART AEROSPACE LTD.**

THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.

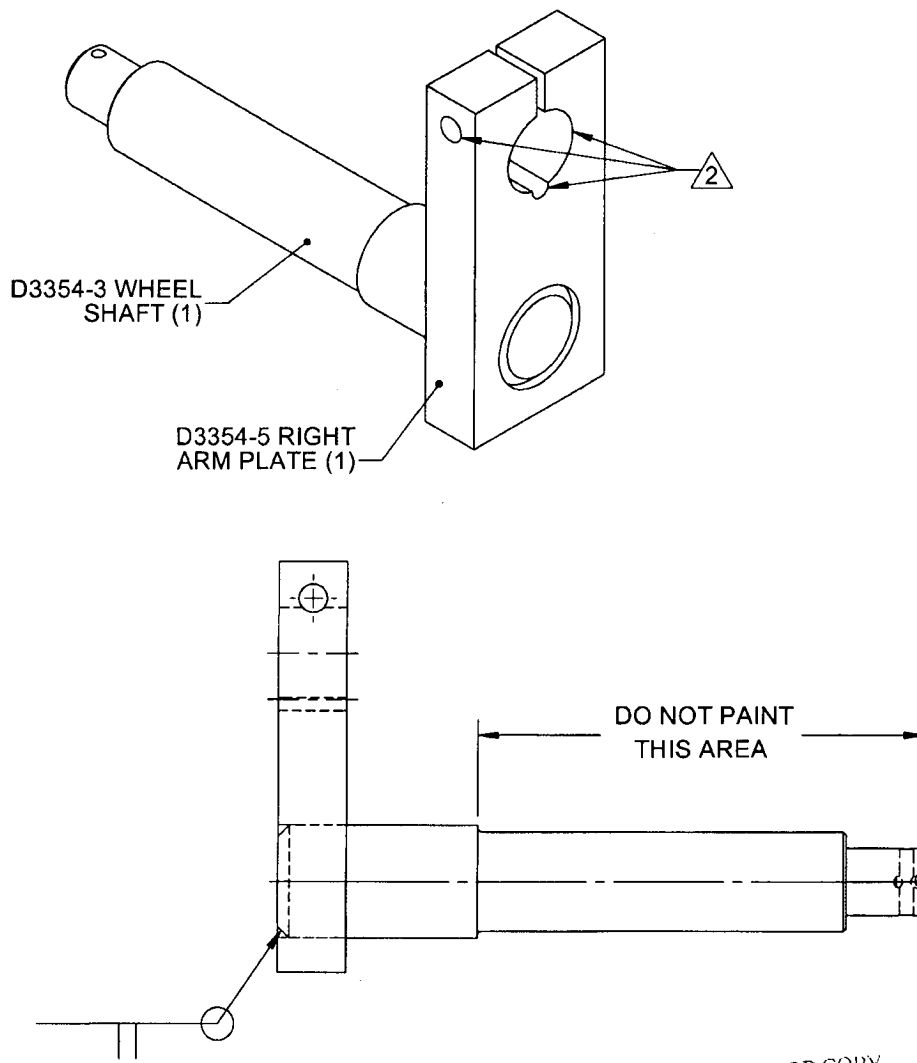




DESIGN RF	DRAWN BY RE	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
CHECKED [Signature]	APPROVED [Signature]	DRAWING NO. <b>D3354</b>	REV. A SHEET 2 OF 7
DATE <b>04.12.13</b>	TITLE <b>LEFT ARM WELDMENT</b>		SCALE 1:2

RELEASED  
06/03/14

MS



### D3354-043 RIGHT ARM WELDMENT

#### NOTES:

- 1) WELD PER DART QSI 004
- 2) COVER INSIDE HOLES PRIOR PAINTING
- 3) FINISH: POWDER COAT PAINT FIRE RED (4.3.5.10) PER DART QSI 005 4.3
- 4) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 5) ALL DIMENSIONS ARE IN INCHES
- 6) BREAK ALL SHARP EDGES 0.010 TO 0.020

SHOP COPY  
RETURN TO  
ENGINEERING  
UNCONTROLLED COPY  
SUBJECT TO AMENDMENT  
WITHOUT NOTICE

WORK ORDER  
29903

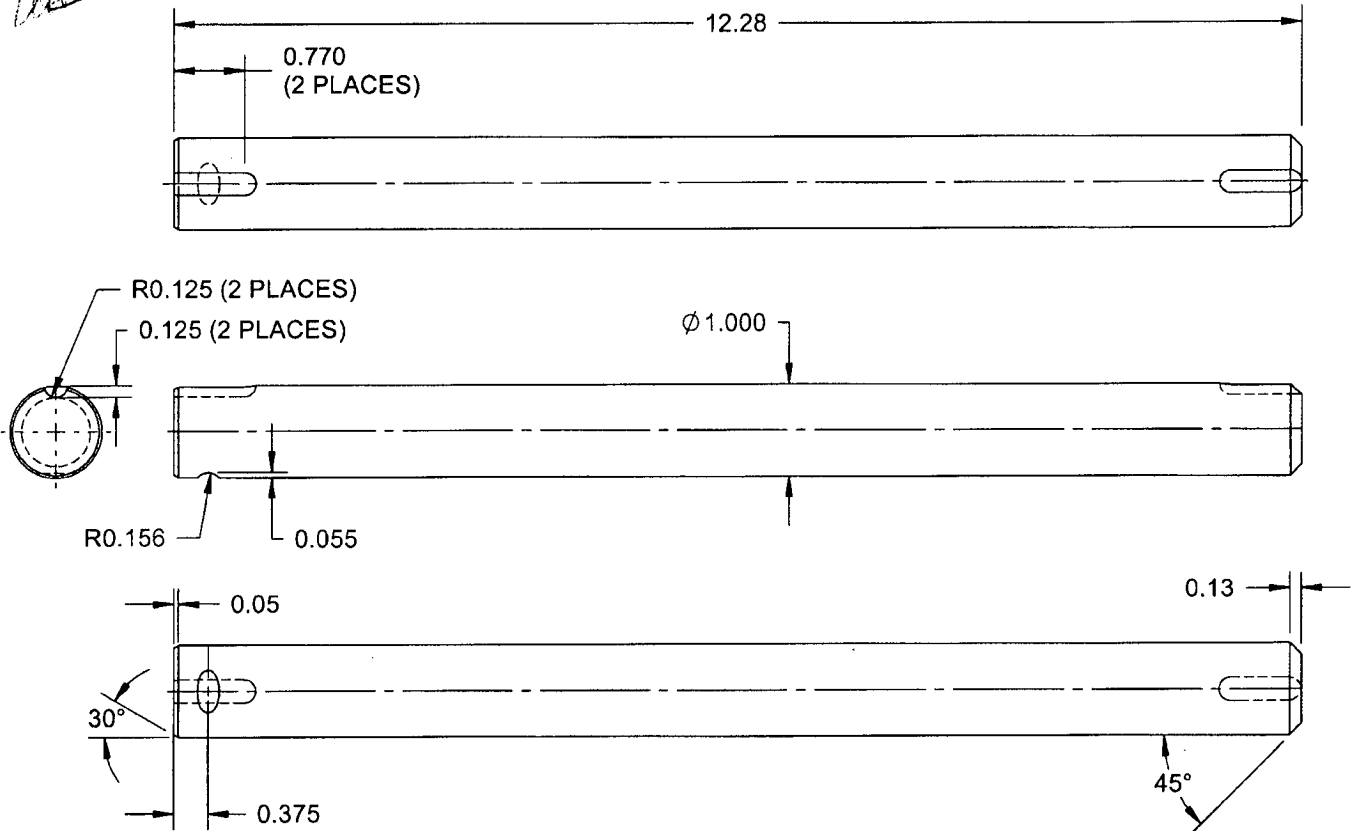
**COPYRIGHT © 2004 BY DART AEROSPACE LTD.**

THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.



**DART**

DESIGN RF	DRAWN BY RF	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
CHECKED [Signature]	APPROVED [Signature]	DRAWING NO. <b>D3354</b>	REV. A SHEET 3 OF 7
DATE <b>04.12.13</b>	TITLE <b>LEFT ARM WELDMENT</b>		SCALE 1:2

**RELEASED**  
36/03/07**D3354-1 INNER SHAFT**

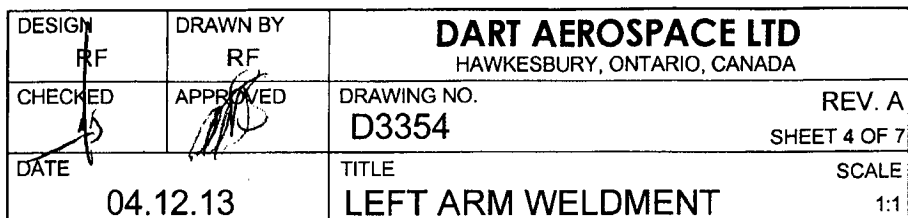
SHOP COPY  
RETURN TO  
ENGINEERING  
UNCONTROLLED COPY  
SUBJECT TO AMENDMENT  
WITHOUT NOTICE  
WORK ORDER  
NO. **29903**

**NOTES:**

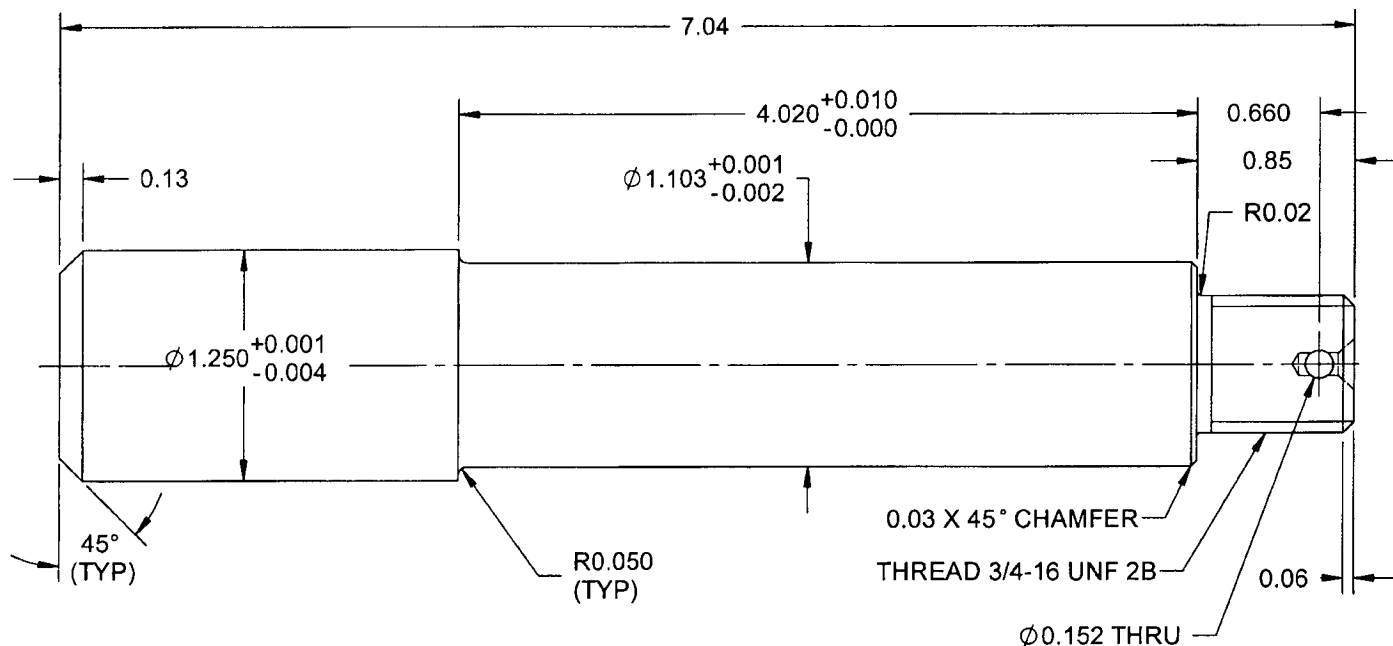
- 1) MATERIAL: AISI-4140 OR ASTM A304-02/ A-434-BC/ A193-03 - GRADE-B7/ A29-03/ A322-91 OR UNS#-G41400 ROUND BAR,  $\phi 1.250$  (REF. DART SPEC. M4140H-R)
- 2) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 3) ALL DIMENSIONS ARE IN INCHES
- 4) BREAK ALL SHARP EDGES 0.005 TO 0.010

**COPYRIGHT © 2004 BY DART AEROSPACE LTD.**

THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.



RELEASED  
26/12/67



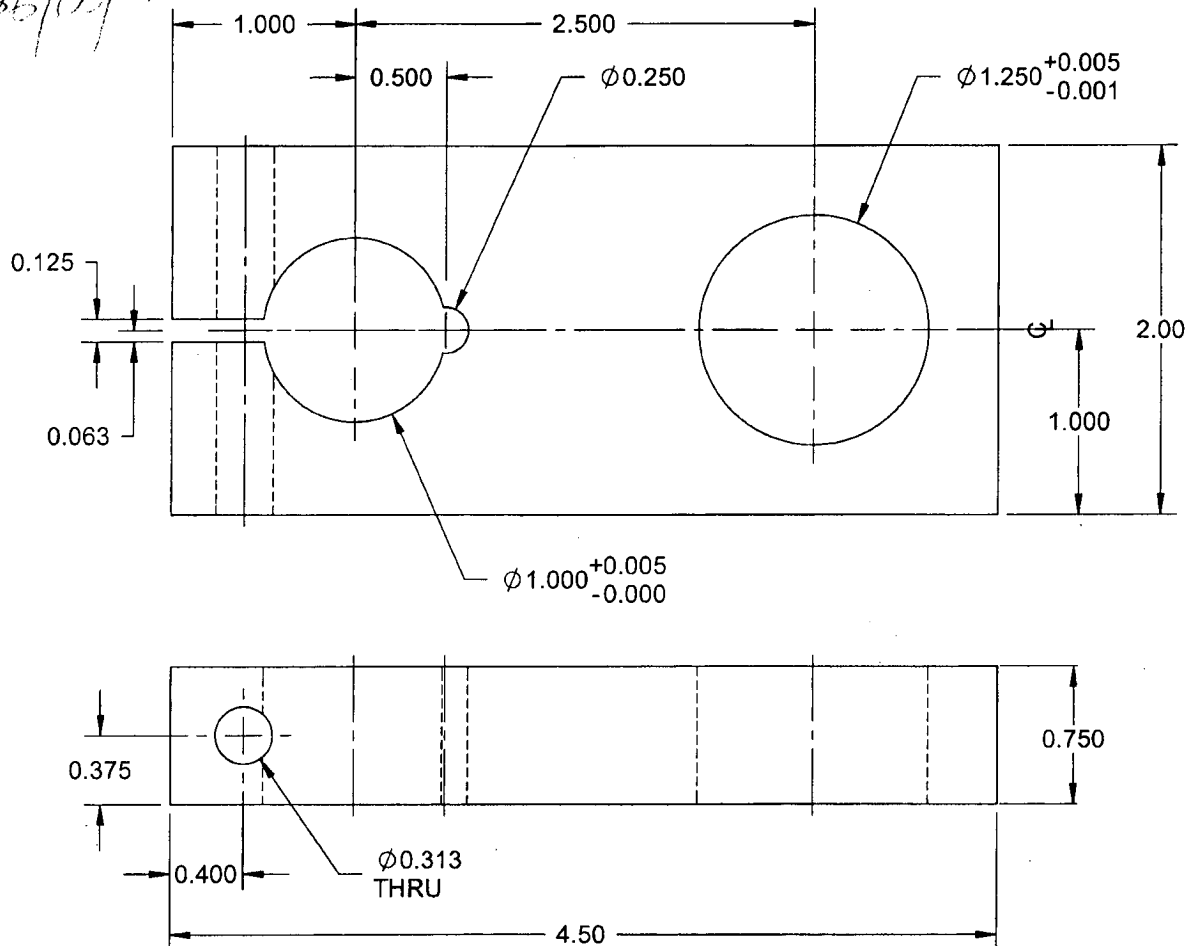
SHOP COPY  
RETURN TO  
ENGINEERING  
UNCONTROLLED COPY  
SUBJECT TO AMENDMENT  
WITHOUT NOTICE  
WORK ORDER  
NO. 29903

1) MATERIAL: AISI-4130/ AISI-4140 OR ASTM A304-02/ A-434-BC/ A193-03 - GRADE-B7/ A29-03/ A322-91  
OR UNS#-G41400 ROUND BAR, Ø1.250 (REF. DART SPEC. M4140H-R)  
2) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED  
3) ALL DIMENSIONS ARE IN INCHES  
4) BREAK ALL SHARP EDGES 0.010 TO 0.020

THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.

**DART**

DESIGN RF	DRAWN BY RF	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
CHECKED <i>[Signature]</i>	APPROVED <i>[Signature]</i>	DRAWING NO. <b>D3354</b>	REV. A SHEET 5 OF 7
DATE <b>04.12.13</b>	TITLE <b>LEFT ARM WELDMENT</b>		SCALE 1:1

**RELEASED**  
*26/03/14***D3354-5 RIGHT ARM PLATE****NOTES:**

- 1) MATERIAL: AISI 1010-1025 OR ASTM A36/A366/A569/A570 OR CSA G40.21, 38W/44W/50W/60W/70W, 0.75 THICK MILD STEEL BAR (REF. DART SPEC. M1010-B)
- 2) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 3) ALL DIMENSIONS ARE IN INCHES
- 4) BREAK ALL SHARP EDGES 0.010 TO 0.020

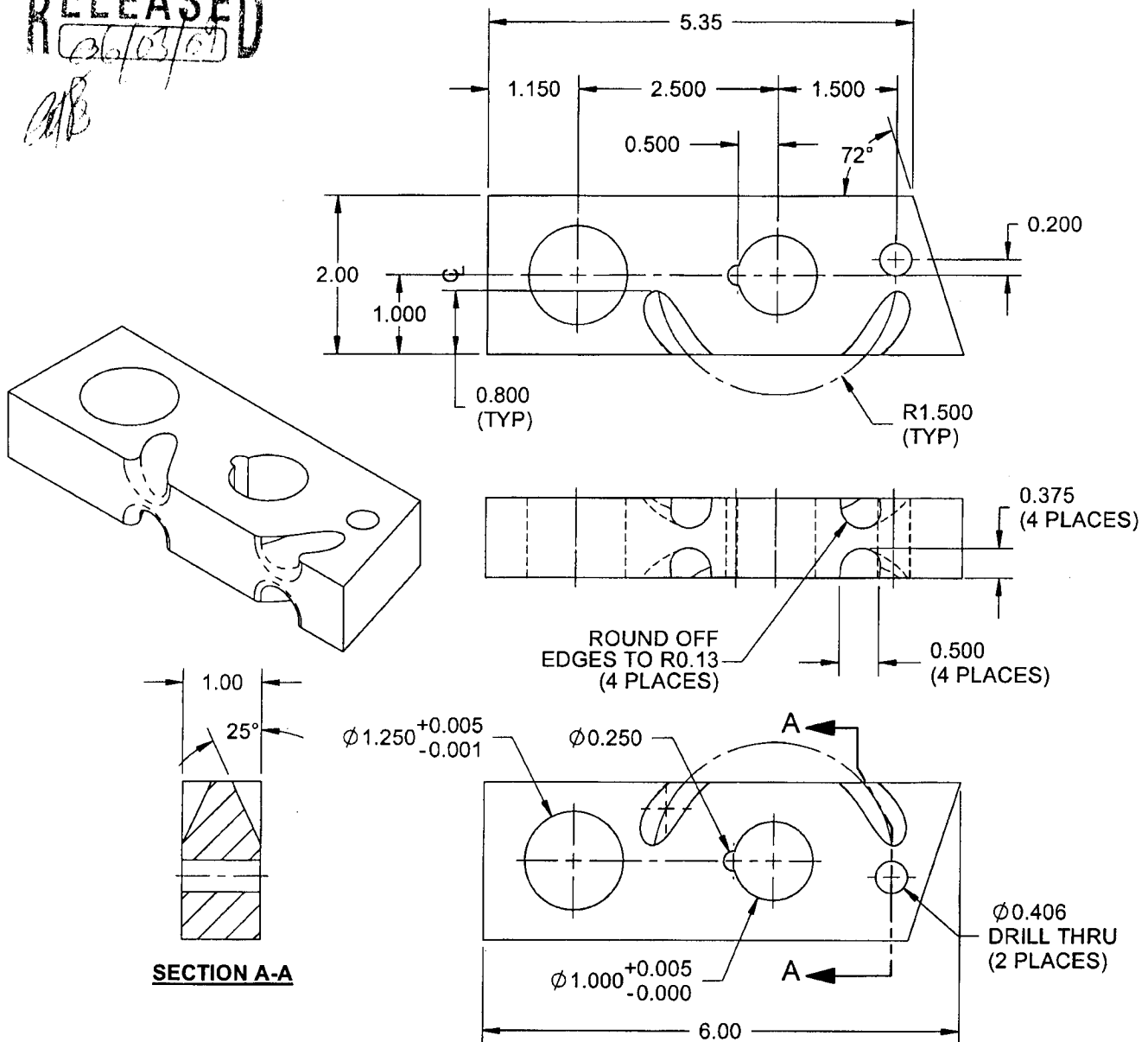
SHOP COPY  
RETURN TO  
ENGINEERING  
UNCONTROLLED COPY  
SUBJECT TO AMENDMENT  
WITHOUT NOTICE  
WORK ORDER  
NO. **29903**

**COPYRIGHT © 2004 BY DART AEROSPACE LTD.**

THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.

**DART**

DESIGN RF	DRAWN BY RF	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
CHECKED [Signature]	APPROVED [Signature]	DRAWING NO. <b>D3354</b>	REV. A SHEET 6 OF 7
DATE <b>04.12.13</b>	TITLE <b>LEFT ARM WELDMENT</b>		SCALE 1:2

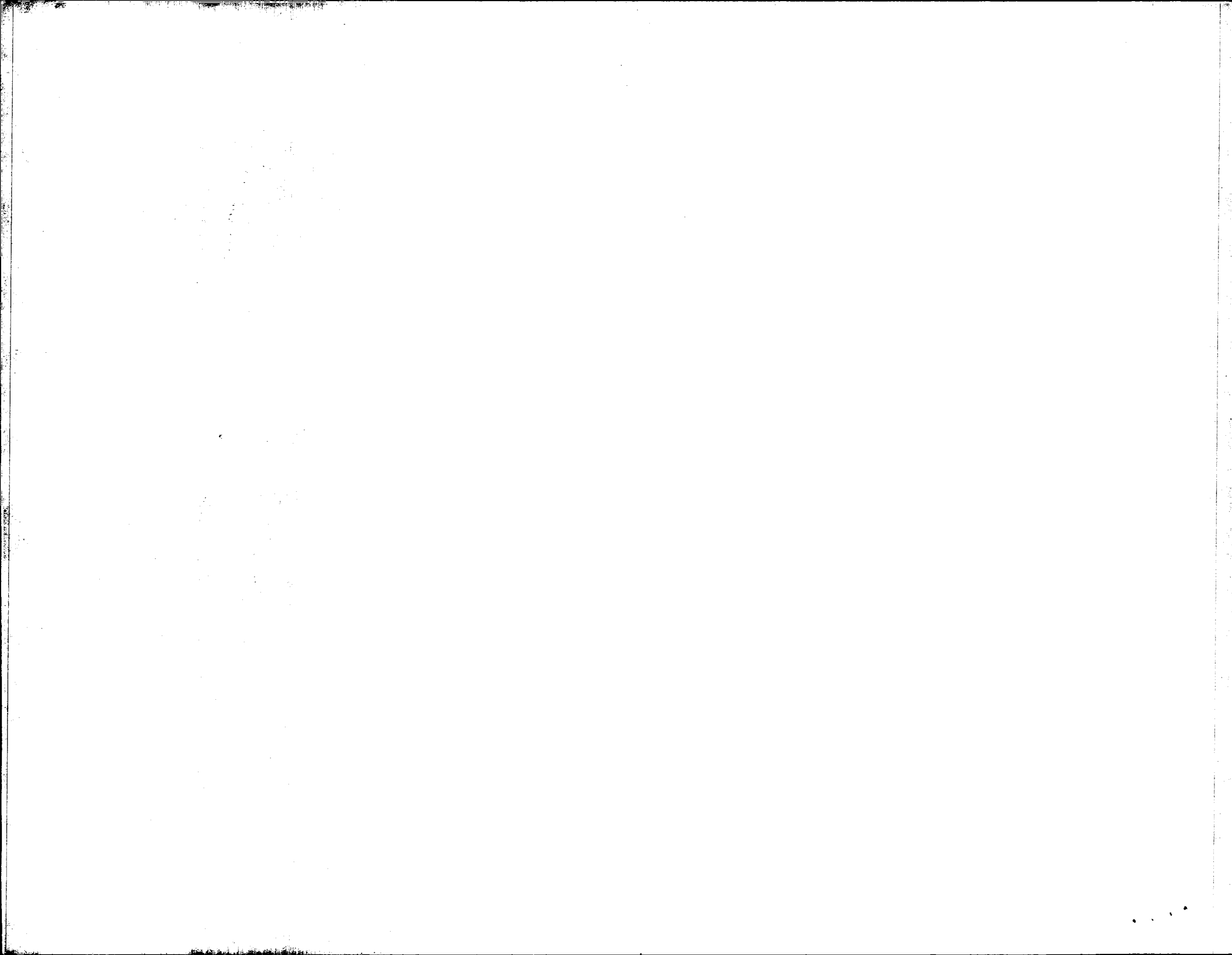
**RELEASED**  
26/03/01  
[Signature]**D3354-7 LEFT ARM PLATE****NOTES:**

- 1) MATERIAL: AISI 1010-1025 OR ASTM A36/A366/A569/A570 OR CSA G40.21, 38W/44W/50W/60W/70W, 1.00 THICK MILD STEEL BAR (REF. DART SPEC. M1010-B)
- 2) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 3) ALL DIMENSIONS ARE IN INCHES
- 4) BREAK ALL SHARP EDGES 0.010 TO 0.020

SHOP COPY  
RETURN TO  
ENGINEERING  
UNCONTROLLED COPY  
SUBJECT TO AMENDMENT  
WITHOUT NOTICE  
WORK ORDER  
NO 29903

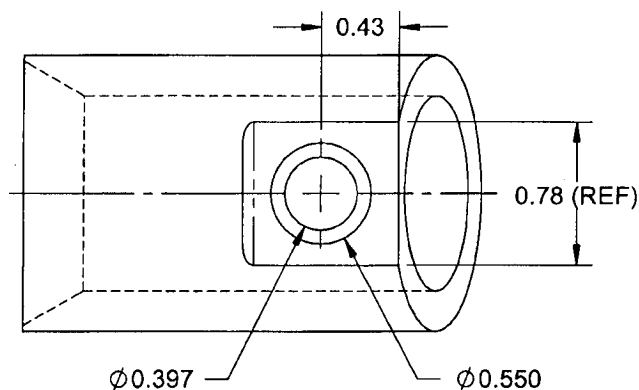
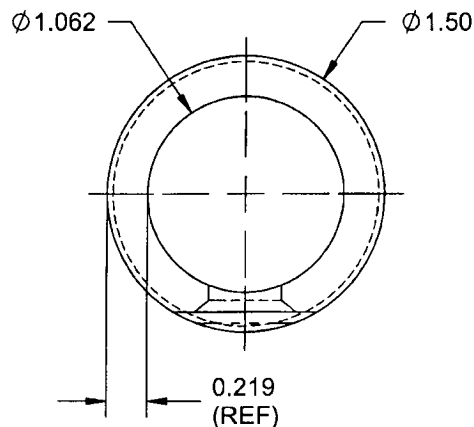
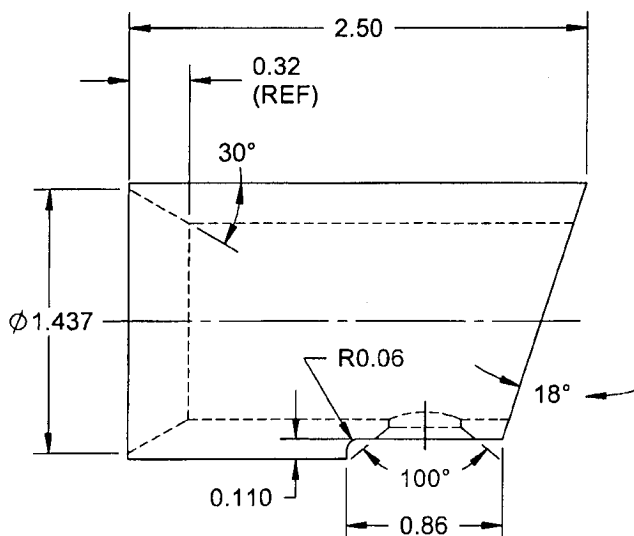
**COPYRIGHT © 2004 BY DART AEROSPACE LTD.**

THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.



**DART**

DESIGN RF	DRAWN BY RF	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
CHECKED 15	APPROVED [Signature]	DRAWING NO. <b>D3354</b>	REV. A SHEET 7 OF 7
DATE <b>04.12.13</b>	TITLE <b>LEFT ARM WELDMENT</b>		SCALE 1:1

**D3354-9 HANDLE SOCKET****NOTES:**

- 1) MATERIAL: AISI 1010-1025 SEAMLESS ROUND TUBING PER MIL-T-5066 OR  
ASTM A513-00 MT1020 SRA OR AMS 5075 OR AMS 5077;  
(REF. DART SPEC. M1020TR1.250W.219)
- 2) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 3) ALL DIMENSIONS ARE IN INCHES
- 4) BREAK ALL SHARP EDGES 0.010 TO 0.020

SHOP COPY  
RETURN TO  
ENGINEERING  
UNCONTROLLED COPY  
SUBJECT TO AMENDMENT  
WITHOUT NOTICE  
WORK ORDER  
NO. **29903**

**COPYRIGHT © 2004 BY DART AEROSPACE LTD.**

THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.